Facts on Demand Conditions and the need for Continued Agricultural Adjustment. 1/

Introduction

The emergency features of the agricultural situation of 1932-1933 that gave rise to the Agricultural Adjustment Act were an unusually low level of domestic industrial activity and purchasing power, a sharp contraction of foreign demand and increase in foreign competition and an unbalanced condition as between the various major commodities and regions of our agricultural production. Considerable improvement has occurred during the past two years, but it has been accompanied by other developments that call for a continuation of our agricultural adjustment policy.

The purchasing power of the domestic markets has increased during the past two years but not sufficiently to warrant a reckless expansion in farm production. Industrial activity is still about 40 percent below the pre-depression trend, eleven million people are still unemployed and 20 million persons are receiving relief, and means do not exist for distributing a greater volume of farm products among the low income groups that consume less than the average, both in prosperity and in depression.

Foreign purchasing power is on a higher level as a result of increased industrial activity abroad, but the foreign demand for our wheat, cotton and pork products has not improved. In some major respects, it is worse now than it was two years ago.

With respect to the internal balance of production as

1/ Material used in address by L. H. Bean before West Detroit Business Executives' Forum, March 1, 1935.

between crops and regions, the unprecedented drought of 1934 has done an enormous amount of damage that calls for a planned restoration of feed crops and livestock numbers, so as to meet the normal requirements of the domestic population and also to avoid the maladjustments that usually result from relatively higher feed crop prices. A relaxation of controls in the production of such commodities as wheat, corn, and cotton, with the probability of more normal growing conditions in 1935 and 1936 than in 1934, and in the face of continued unemployment and low foreign demand, could easily bring back the huge surpluses of these commodities that prevailed in 1932 and 1933. A normal wheat crop with no more of an export outlet than we have now would add at least 150 million bushels to our present carryover, which is still somewhat above normal. A normal cotton crop would add 2 million bales or more to a carryover that is still well in excess of normal; and a normal corn crop would give us an excess of 500 million bushels or more in relation to the reduced livestock population. Not even a vigorous restoration of industrial production to pre-depression levels would enable the domestic markets to absorb normal crops in 1935 and 1936 without forcing stocks up and farm prices down.

The national income which in 1929 was 80 billion dollars and in 1933, 46 billions, totaled nearly 52 billions in 1934. While the farmer's share of that small total was noticeably larger than in 1932 and the farm standard of living was considerably improved, agriculture in 1934 needed a 25 percent higher level of prices to achieve "parity" prices, or the prewar standard of living for farmers, or their prewar per capita share of the national income.

In view of the subnormal financial returns in agriculture that have prevailed since 1927, and in intensified form since 1930, it might be argued that agriculture from now on should have a period of general years of farm prosperity well above the prewar levels. But to attain such conditions farmers must look forward to (1) a balancing of their production as between the several branches of agriculture so as to undo the damage done by the 1934 drought; (2) an increase in industrial production as a basis for increased city purchasing power, accompanied by a larger exchange value of farm products for industrial products--the latter to be brought about either by a rising level of farm prices or by a declining level of industrial prices, or by a combination of the two; (3) a reopening of our foreign markets for wheat, cotton, and pork, and increased foreign purchasing power for the other farm products we export; (4) a lowering of those costs of distribution that now take an inordinate share of the spread between farm prices and city retail prices.

I. Farm Prices and Parity Prices.

The general level of farm prices has risen in the past few months largely because of the drought-reduced supplies of grains and livestock; and while some agricultural prices have, by this drastic means, approached parity, they have not contributed to improvement in farm income. The excessive reductions in feed crop production and in livestock numbers, though reflected in higher prices than prevailed a year ago, have not lifted farm income during the three months of November, December and January above the income for the same three months a year ago. The present relation to parity prices, though considerably

improved, is therefore a temporary one, in view of the larger acreages that are provided for in the 1935 adjustment programs and in view of the very reasonable prospect of growing conditions in 1935 more nearly normal than they were in 1934. A rise of substantial proportions in industrial production, employment and payrolls might help sustain the recent gains.

Farm Prices Received and Prices Paid by Farmers
January 1929-1935

1910-1914 = 100

	---Prices Received---						
	Grains	Meat Animals	Cotton & seed	Dairy Prods.	All Groups	Prices Paid	Ratio
1929......	114	146	147	163	147	154	95
1930......	118	147	128	146	145	151	96
1931......	76	111	72	118	101	136	74
1932......	52	68	45	97	71	115	62
1933......	35	51	45	81	60	102	59
1934......	76	55	82	84	77	117	66
1935......	115	96	108	112	107	126	85

As of January 15, 1935 the general level of farm prices at 107 percent of prewar, and prices paid by farmers at 126 percent of prewar, gave farm prices a purchasing power of 85 percent of prewar.

On seven of these commodities, processing taxes are being collected and benefit payments made to cooperating producers on part of their production. If these are included as part of prices received, then the general level of farm prices in January 1935 may have been somewhat over 90 percent of prewar.

The effect of the 1934 drought on this rise of farm prices is seen in the fact that between February and May of 1934 the general average of farm prices was between 82 and 84 percent of prewar; by

September it had risen to 103 percent, and after a slight decline it advanced to 107 percent on January 15. Normal growing conditions in 1935, with no further improvement in domestic and foreign demand, could easily wipe out half of the gain of the past six months, and more might be lost but for the fact that livestock production cannot be as quickly restored as can crop production.

II. Farm Income

The mere restoration of parity prices without regard to the basic factors that accomplish that result may not give the producers their proper share of the national income or restore their prewar and pre-depression standards of living. It has been assumed from the fact that total farm production varies little from year to year, that restoring the relative purchasing power of unit farm products to prewar levels would in general restore farm income and its purchasing power to prewar levels. As far as can be determined from such statistics as are available at present, this assumption is approximately correct for the situation as it existed in 1934, but this may not be the case in the next year or two.

In 1934 the relative purchasing power of unit farm products averaged 73 percent of their prewar level, and probably about 80 percent if benefit payments are included as additions to farm prices received for current marketings. The net income from the production of 1934 used for sale or in the farm home also had a relative purchasing power of nearly 80 percent of the prewar level, compared with about 52 percent in 1932. Similarly, the farmer's share of the national income on a per capita basis in 1934 also was about 80 percent

of his prewar share, as compared with about 60 percent in 1932.

These three measures of the agricultural situation showed considerable divergence in years prior to 1934 and they are of course likely to show differences in the future. Each, however, reveals the failure of agriculture to emerge out of the post-war depression during the period of general prosperity 1923-29. In combination, they suggest that the depression following 1929 brought agricultural conditions about twice as much below prewar levels as the post-war depression did, and that the improvement of 1933 and 1934 has brought agriculture approximately to the conditions that prevailed in the depression year 1921. In these generalizations there are of course embodied wide regional and commodity differences.

(a) Farm Net Income and Purchasing Power

A price-ratio measure of the agricultural situation is of course deficient in several important respects. Costs other than commodity costs are not included; nor are the volume of purchases of goods and services and the volume of sales of farm products included. Had adequate facts for these items been available, it is conceivable that the standard for the Agricultural Adjustment Act might have been a broader one, more nearly an income standard than a price-ratio standard. The necessary data are still lacking, but some approximations may be obtained by piecing together what is available.

An attempt to take changes in volume of both sales and purchases into account is made in table 2. From estimates of gross farm income as published by the Bureau of Agricultural Economics, there have been deducted selected expense items which constituted in the

post-war years approximately 90 percent of the total production expenditures as estimated by the Bureau, exclusive of the labor of the farm operator and his family. The balance thus obtained is available as return for the farmer's investment for his labor and gives approximately the "net" income available for the goods and services used in the farm home to maintain the farmers' standard of living. Between 1909 and 1929, gross income increased 77 percent, and estimated expenditures increased 141 percent.

"Net" income attained a purchasing power of 128 percent and 135 percent of prewar during 1917 and 1918, declined to 65 percent in 1921, reached 97 percent in 1925, stood at 91-92 percent in 1928-29. In this depression, it declined to 52 percent in 1932 and by 1934 recovered to 79 percent. The year to year changes in this series are shown in table 2.

(b) The farmer's share of the national income.

The farmer's share of the national income in 1934 was noticeably improved over the low point of 1932, but is still considerably below "normal" as indicated by prewar trends. In 1909 the farmer's share was 18.9 percent in 1914, 16 percent. In 1918 and 1919 it rose temporily to 20.5 percent and then fell abruptly to 12.6 percent. In the period 1926-1929 the share ranged between 10.4 and 11.0 percent and then reached the historic low of 7.5 percent in 1932. By 1934, when benefit payments and receipts from the excess sale of livestock in the drought areas are taken into account, it reached 10.2 percent.

The farmer's share of the national income has of course declined during the past century as the percentage of people living on farms or

Table 2.--Farm Income and Expenditures and Ratio of Balance to Expenditures

Year	Gross income 1/	Selected expenditures 2/	Balance available	Gross income	Selected expenditures	Balance available	Prices paid for commodities bought for family maintenance	Ratio of available income to expenditures
	Million dollars			Percent (1910-14 = 100)				
1909...	6,238	1,886	4,352	92	87	95	96	99
1914...	7,028	2,338	4,690	104	108	102	102	100
1917...	12,832	3,543	9,289	190	163	203	147	138
1918...	15,101	4,186	10,915	223	193	238	177	135
1919...	16,935	4,820	12,115	251	222	264	210	126
1921...	8,927	4,136	4,791	132	190	104	161	65
1925...	11,968	4,691	7,277	177	216	159	164	97
1929...	11,941	5,246	6,695	177	241	146	158	92
1932...	5,331	2,758	2,573	79	127	56	108	52
1933 3/	6,256	2,553	3,703	93	117	81	109	74
1934 3/	7,200	2,800	4,400	107	129	96	122	79

1/ Calendar years for livestock and livestock products, crop years for crops, as reported by the Bureau of Agricultural Economics.
2/ Includes: (1) Wages (cash and board); (2) feed; (3) fertilizer; (4) taxes; (5) mortgage interest (total); (6) ginning expense; (7) purchases and operating expenses of all farm machinery (including tractors, trucks, and one-half automobiles); harness and saddlery.
3/ Including rental and benefit payments.

The total of these selected items was equivalent to 94 percent of all production expenses for the 10-year period 1924-33, as reported in the August 1934 Crops and Markets, p. 315. However, these reported production expenses did not include board as a part of the wage bill. If board (which is among the selected items enumerated above) is added to the total production expenditures reported, then the selected items are equivalent to 90 percent of the total for the 10-year period. The detailed expenditure figures from 1919 through 1933 were furnished by the Bureau of Agricultural Economics. Prior to 1919 estimates are partially those of the Bureau and partially those of the Agricultural Industrial Relations Section of the Agricultural Adjustment Administration.

engaged in agriculture declined. In 1900 when 36 percent were gainfully occupied in farming, agriculture's share of the national income was about 21 percent, and in 1920 when 26 percent of the gainfully occupied were engaged in agriculture, their share of the national income was about 17 percent.

On a per capita basis, the national income for the 90 million people in the United States in 1909 was $294; for the farm population of 32 million it was $155, or 53 percent of the average for all. In 1932 the average for the entire population of nearly 125 million people was $385 (including relief payments), and for the 31 million of farm population it was $115, or 30 percent of the average for all. Thus, as shown in table 3, the per capita share of farm income fell to about 60 percent of the prewar level in 1932 and by 1934 it advanced to 79 percent.

Table 3.--National and Farm Income Per Capita, 1909-34

Year	Population (000)		Per capita income 2/			
	Total United States	Farm	Total United States	Farm 1/	Ratio farm to total: Annual	Ratio farm to total: 1910-14 = 100
					Percent	Percent
1909.....	89,882	32,123	$294	$155	53	105
1914.....	97,220	31,892	326	159	49	97
1917.....	101,466	31,753	459	289	63	125
1918.....	102,880	31,707	533	353	66	132
1919.....	104,296	31,660	571	385	67	134
1921.....	107,375	31,703	516	220	43	85
1925.....	114,035	31,064	641	293	46	91
1929.....	120,694	30,257	660	273	41	82
1932.....	124,511	31,241	385	115	30	60
1933.....	125,197	32,242	368	141	38	76
1934.....	126,059	32,509	412	163	40	79

1/ Population figures for 1909 to 1919 interpolated. Non-census years following 1920 are estimates by the Bureau of Agricultural Economics.
2/ Based on estimates of national income and on amounts contributed by agriculture derived primarily from farm production, other sources of income to farm people not included.

On the basis of the experience of post-war years, during which agriculture as a whole had failed to keep pace with general prosperity, the 1934 share instead of being 10 percent should perhaps be around 12 to 13 percent, or about 25 percent higher than at present, assuming that agriculture is not entitled to something more than average for several years to offset the recent subnormal years.

This basis, however, is a misleading one since the farmer's share tends to be low in periods of declining prices such as the period of the 1880's and 1890's, and the 1930's. The relation, in such data as are available on the farmer's share of the national income to the percentage gainfully occupied in agriculture for the favorable price years 1870, 1900, 1910, and 1920, suggests that the 1934 share should be about 15 percent

This would mean adding about $2,500,000,000 to the $5,200,000,000 of agricultural income included in the national total of $52,000,000,000 in 1934. Were the national income to advance during the next few years to $75,000,000,000, or a gain of $23,000,000,000 from the present level, agriculture would need an increase of about $6,000,000,000, or a fourth of the total, if its share were to be restored to 15 percent instead of the present 10 percent.

It is of course impossible to determine how soon the national level of industrial activity and the foreign demand for our products would rise sufficiently to restore our national income to 75 billions. At the rate of increase of the past two years, it would require another four years, but during this interval farmers acting individually could easily, without national production adjustment programs, build up new surpluses and keep agriculture as a whole from sharing in the general recovery, just as it failed to keep pace in the pre-depression years.

III. The Farmer's Share of the Consumer's Dollar.

In January 1929 the monthly per capita consumption of fourteen food items of a typical industrial family amounted to about $26.00, of which the farmer received about $12.00, leaving a margin for all distribution costs, charges and profits of about $14.00. The farmer's share of the retail value was 46.2 percent. In January 1933 the retail value was about $10.25 lower but the margin only $3.53 lower; and this resulted in a disproportionate decline in farm value to $5.29. The farmer's share of the retail value went down until it was only 33.6 percent. By January 1935 the retail value had increased by about $4.00, Of this increase farmers received about $3.00 and about $1.00 went to increase the margin. The farmer's share in January 1935 was 42.2 percent.

The Farmer's Share of the Consumer's Retail
Expenditures for 14 Food Items.

Jan.	Farm Value	Retail Value	Margin	Farmer's share of Consumer's dollar (percent)
1929......	$12.00	$25.99	$13.99	46.2
1930......	12.52	25.77	13.25	48.6
1931......	8.76	21.92	13.16	40.0
1932......	6.26	18.12	11.86	34.5
1933......	5.29	15.75	10.46	33.6
1934......	6.09	17.41	11.32	35.0
1935......	8.32	19.17	11.39	42.2

While this is a substantial gain over the low point of 1933 and a noticeable approach to the pre-depression share of the consumer's dollar going to farmers, it should be observed that a large part of this advance is temporary in so far as it is based on the abnormal drought of 1934.

Just as the farmer's per capita share of the national income, his standard of living and his prices are by and large still below prewar relationships, so his share of the consumer's dollar is still below what it was before the war. The extent to which it is still below the prewar share has as yet not been finally determined, but preliminary data suggest that for the fourteen items included in the foregoing figures, it may still be, say, about 40 percent below. This is partly indicated by the fact that distribution costs, according to estimates of Drs. Warren and Pearson, were 58 percent higher in December 1934 than in the prewar years.

At the beginning of 1935, the retail value of the ten food items is about $3.70 higher than during 1933, and most of that increase is showing up as increased receipts by producers, who in January 1935 received about 44 percent of the consumer's dollar. While this is a substantial gain over the low point of 1933 and a noticeable approach to the prewar share of the consumer's dollar going to farmers, it should be observed that a large part of this is a precarious and temporary price gain due to the 1934 drought.

IV. Domestic Demand.

(a) The Aggregate Income of Urban Consumers.

During 1929 the income of urban consumers averaged around 6.4 billion dollars per month, and the farmer's cash receipts from marketings around 800 to 900 million dollars per month. In March 1933 consumers' income totaled only 3.5 billion dollars and farm cash income was at a monthly rate of 310 million dollars. Between March 1933 and January 1934 consumers' incomes advanced fairly rapidly, about 21 percent, and remained at a stable level of about 4.2 billions

per month throughout 1934. Farm cash income averaged about 550 million dollars per month during the year but went higher than that during the summer months and below that during the last quarter of the year.

The failure of consumer incomes to advance during 1934 is in a measure reflected in the returns from farm marketings. In January 1929 the index of consumer incomes averaged 106 percent of the 1924-1929 average. In January 1933 it averaged only 63 percent; in January 1934, 73 percent; and in January 1935, 74 percent. Similarly, farm cash income, which amounted to about 900 million dollars in January 1929, was only 344 million dollars in January 1933. It amounted to 425 million in January 1934 and to 428 million in January 1935.

The improvement in farm income since 1932 has accomplished several things, among them a restoration of a closer balance between the returns from the products sold primarily in the domestic markets and the returns from the products affected largely by export demand and international conditions. During this process of adjustment, the improved returns for the export products preceded the general improvement in industrial conditions and consumer incomes. The returns from both of these two broad groups of farm products are now more nearly in line with the pre-depression relation to urban consumers' income, and their further increase rests very largely upon an increase in the national income.

Jan.	Index of Urban Consumer Income 1924-1929=100 percent	Cash Farm Income	Cash Income including Benefit Payments
		million dollars	
1929	106	897	
1930	107	827	
1931	93	589	
1932	77	437	
1933	63	344	
1934	73	425	485
1935	74	428	509

During the last half of 1932, cash income from crops was only 30 percent of the 1924-1929 level and cash income from livestock products 49 percent, with the income of urban consumers at 63 percent. During the first half of 1933, cash income from crops rose to 50 percent of the pre-depression level, while the national income, and therefore the returns from livestock and their products, continued downward to somewhat lower levels. During the last half of 1934, including benefit payments and taking seasonal conditions into account, crop income averaged 65 percent, livestock 68 percent and urban consumers' income 72 percent of the pre-depression level.

It is important to observe further that during 1934 crop income tended slightly downward while income from livestock increased, indicating that the sharp reductions in feed crops due to the drought, though they have brought higher prices, do not mean higher incomes except in those areas that were favored with good crops. Agriculture as a whole is not benefited by excessive reductions, especially in crops where export surpluses have not been a major factor contributing to low prices.

Income of Urban Consumers and Cash Income from Crops and Livestock. 1924-1929 = 100

July-Dec.	Cash income from crops	Cash income from livestock	Income of urban consumers
1924.....	104	89	88
1929.....	97	109	110
1932.....	30	49	63
1933..... 1/	60	55	66
1934..... 1/	65	68	72

1/ Includes benefit payments to farmers and relief expenditures to urban consumers.

(b) Unemployment and Relief.

To a very large extent further improvement in the general agricultural situation depends upon further industrial revival, reduction

of unemployment, and the transfer of relief cases receiving subsistence to private payrolls where they will receive a decent wage. This would allow some increase in the consumption of farm products, particularly in industrial uses and by the low income groups who have been forced to curtail their food purchases; but the chief gain would be in enabling millions of consumers to pay more for their purchases and thus give farmers a larger purchasing power for industrial goods.

It has been officially estimated that at the beginning of 1935 there were nearly eleven million people unemployed or about 22 percent of the total that should be gainfully occupied. This is probably about 3 million less than at the peak of unemployment in March 1933.

The number of families and persons on relief is nearly as large now as in March 1933, in spite of the increase in employment. In March 1933 there were 4,560,000 families, representing probably over 20 million persons receiving relief. By January 1934 the number of families on relief had declined to 2,486,000 and the number of persons to 11 million when Works projects were under way; but by December 1934 there were again 4,459,000 families or about 20 million persons on relief. This constitutes 16 percent of the total population.

These unemployed must be restored to wage paying jobs if the national income is to rise and if farm income is to rise with it.

(c) Industrial production.

For industry to make its full contribution to agricultural recovery calls for a restoration of industrial production at least to the pre-depression trends, with prices such that farmers may restore and advance their standards of living by purchasing industrial products more freely. Such a restoration of industrial activity must include reemploying those

not now gainfully occupied, for otherwise the purchasing power of domestic consumers as a group will continue deficient. In recent months, industrial production, particularly in a few major branches of industry, has been expanded, but this expansion is yet to be placed on a permanent basis. It must reach into the construction field as well as manufacturing, and fuller reemployment must take place if a better balance is to be attained between agricultural and industrial progress.

During 1934 the production of industrial goods was still only 58 percent of the 1929 level, while agricultural products processed in factories were maintained at 85 percent of the 1929 level. Thus, the volume of industrial products was down 42 percent and of agricultural products 15 percent. The price situation was just the reverse. Prices for farm products were 39 percent lower than in 1929, and industrial prices 14 percent lower.

Considerable progress has been made in recent months toward restoring the pre-depression balance between agricultural and industrial production and prices, but in so far as that balance rests on temporary agricultural price gains due to drought and temporary increases in industrial production not supported by real expansion in employment and consumer incomes, agricultural recovery will remain checked at its present level.

In January 1935 industrial production as a whole averaged 90 percent of the 1923-25 level. This represents an increase of 17 percent in manufactures during the past year, accompanied by an increase of only 7 percent in factory employment. The January 1935 level also represents a 50 percent expansion over the low level of 1933 (with factory employment up 33 percent), but it is still 25 percent below the 1929 level and about as much below the pre-depression trend.

To what extent is this recent advance in part temporary, just as were the advances which were checked in July 1933 and again in May 1934? Can this advance, particularly in the automobile and iron and steel industries, be sustained, with the construction industry still at only 29 percent of the 1923-25 level and only a fourth of the 1929 level? If a 50 percent expansion in industrial output from 60 percent of the 1923-25 level in March 1923 to 90 percent in January 1935 has been accompanied by only a 33 percent increase in factory employment, and a decrease of about 25 percent in total unemployment, leaving nearly eleven million still unemployed; and if at the same time there has been no diminution in the aggregate of persons (about 20 millions) on relief - then farmers may reasonably ask to what extent domestic demand and consumer incomes would expand even if industrial production returned to the 1929 level. Are we faced with a permanent unemployment and relief program? No one, of course, can give positive answers to these questions, but they suggest the nature of the basic difficulties that confront agriculture from the standpoint of demand.

Long continued unemployment would tend to increase the amount of labor seeking economic shelter in agriculture. Relief efforts would tend toward the placement of cases on the land, thus hampering the attainment of balanced production, reducing farm wages, increasing to some extent the aggregate farm output and at the same time lessening the urban requirements for farm products.